

INTERNATIONAL SEARCH REPORT

International Application No

PCT/IE 03/00098

A. CLASSIFICATION OF SUBJECT MATTER

IPC 7 C12Q1/68

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 C12Q

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

EPO-Internal, WPI Data, BIOSIS, MEDLINE, CHEM ABS Data, EMBASE

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	WO 02 36821 A (MCCARTHY THOMAS VALENTINE ; COLLINS RUAIRI (IE); UNIV COLLEGE CORK) 10 May 2002 (2002-05-10)	1-6, 9-13, 15-18
Y	abstract page 10, line 1 - page 23, line 2; cf. in particular p. 10, line 1 - line 18 and p. 15, line 15 - p. 17, line 11 claims 1-29 --- -/--	7,8



Further documents are listed in the continuation of box C.



Patent family members are listed in annex.

* Special categories of cited documents:

- *A* document defining the general state of the art which is not considered to be of particular relevance
- *E* earlier document but published on or after the international filing date
- *L* document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)
- *O* document referring to an oral disclosure, use, exhibition or other means
- *P* document published prior to the international filing date but later than the priority date claimed

T later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention

X document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone

Y document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art.

& document member of the same patent family

Date of the actual completion of the international search

30 September 2003

Date of mailing of the international search report

13/10/2003

Name and mailing address of the ISA

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C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X Y	US 2002/072095 A1 (BERNINGER MARK ET AL) 13 June 2002 (2002-06-13) abstract page 1, right-hand column, paragraph 6 -page 4, right-hand column, paragraph 1 page 7, right-hand column, paragraph 4 claims 1-46	1-6, 9-13, 15-18 7,8
X Y	WO 99 13108 A (UNIV MARYLAND ;US HEALTH (US); HSU IH CHANG (US); SHIH JAMES W (US) 18 March 1999 (1999-03-18) abstract page 5, line 1 -page 7, line 5 claims 1-22	1-6,9, 11-13, 15-18 7,8,10
X Y	WO 97 03210 A (FORFAS TRADING AS BIORESEARCH ;UNIV CORK (IE); MCCARTHY THOMAS VAL) 30 January 1997 (1997-01-30) cited in the application abstract page 8, line 8 -page 20, line 31 claims 1-20 figures 1-9	1-6,9, 11-13, 15-18 7,8,10
X Y	WO 99 54501 A (MCCARTHY THOMAS VALENTINE ;UNIV CORK (IE); IRELAND TRADING AS BIOR) 28 October 1999 (1999-10-28) cited in the application abstract page 2, line 6 -page 26, line 19 claims 1-24 figures 1-7	1-6,9, 11-13, 15-18 7,8,10
X Y	US 6 090 553 A (MATSON ROBERT S) 18 July 2000 (2000-07-18) abstract column 3, line 53 -column 6, line 57 claims 1-27	1-6,9, 11-13, 15-18 7,8,10

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C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
Y	SCHOUTEN KAREN A ET AL: "Endonuclease V protects Escherichia coli against specific mutations caused by nitrous acid." MUTATION RESEARCH, vol. 435, no. 3, 7 December 1999 (1999-12-07), pages 245-254, XP002255391 ISSN: 0027-5107	10
A	abstract	1-9, 11-13, 15-18
Y	GUO GUANGMING ET AL: "Endonuclease V (nfi) mutant of Escherichia coli K-12." JOURNAL OF BACTERIOLOGY, vol. 180, no. 1, January 1998 (1998-01), pages 46-51, XP002255392 ISSN: 0021-9193	10
A	abstract	1-9, 11-13, 15-18
Y	HUANG JIANMIN ET AL: "An endonuclease/ligase based mutation scanning method especially suited for analysis of neoplastic tissue." ONCOGENE, vol. 21, no. 12, 2002, pages 1909-1921, XP002255393 14 March, 2002 ISSN: 0950-9232	7,8
A	abstract	1-6, 9-13, 15-18

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Box I Observations where certain claims were found unsearchable (Continuation of item 1 of first sheet)

This International Search Report has not been established in respect of certain claims under Article 17(2)(a) for the following reasons:

1. ☐ Claims Nos.:
because they relate to subject matter not required to be searched by this Authority, namely:
2. ☒ Claims Nos.: 14
because they relate to parts of the International Application that do not comply with the prescribed requirements to such an extent that no meaningful International Search can be carried out, specifically:
see FURTHER INFORMATION sheet PCT/ISA/210
3. ☐ Claims Nos.:
because they are dependent claims and are not drafted in accordance with the second and third sentences of Rule 6.4(a).

Box II Observations where unity of invention is lacking (Continuation of item 2 of first sheet)

This International Searching Authority found multiple inventions in this International application, as follows:

1. ☐ As all required additional search fees were timely paid by the applicant, this International Search Report covers all searchable claims.
2. ☐ As all searchable claims could be searched without effort justifying an additional fee, this Authority did not invite payment of any additional fee.
3. ☐ As only some of the required additional search fees were timely paid by the applicant, this International Search Report covers only those claims for which fees were paid, specifically claims Nos.:
4. ☐ No required additional search fees were timely paid by the applicant. Consequently, this International Search Report is restricted to the invention first mentioned in the claims; it is covered by claims Nos.:

Remark on Protest

- ☐ The additional search fees were accompanied by the applicant's protest.
- ☐ No protest accompanied the payment of additional search fees.

FURTHER INFORMATION CONTINUED FROM PCT/ISA/ 210

Continuation of Box I.2

Claims Nos.: 14

Present claim 14 does not comprise any clearly defined features and is hence considered to unclear to the extent that it is not searchable (Article 6 PCT).

The applicant's attention is drawn to the fact that claims, or parts of claims, relating to inventions in respect of which no international search report has been established need not be the subject of an international preliminary examination (Rule 66.1(e) PCT). The applicant is advised that the EPO policy when acting as an International Preliminary Examining Authority is normally not to carry out a preliminary examination on matter which has not been searched. This is the case irrespective of whether or not the claims are amended following receipt of the search report or during any Chapter II procedure.

INTERNATIONAL SEARCH REPORT

Information on patent family members

Application No
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Patent document cited in search report		Publication date	Patent family member(s)	Publication date
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